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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/022,823	12/18/2001	Tong Sun	KCX-436.B (16659.B)	3789

7590 06/22/2004

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EXAMINER

COLE, ELIZABETH M

ART UNIT	PAPER NUMBER
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1771

DATE MAILED: 06/22/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/022,823

Applicant(s)

SUN ET AL.

Examiner

Elizabeth M. Cole

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 4/12/04.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 16-32 is/are pending in the application.
- 4a) Of the above claim(s) 29-31 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 16-28 and 32 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 3/15/04
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

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1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 16-18, 32 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-45 of copending Application No. 10/023,489. Although the conflicting claims are not identical, they are not patentably distinct from each other because each teaches treating cellulosic fibrous materials with polyvinylamines and polymeric anionic reactive compounds.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 16-18, 20-23, 26-28, 32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schrell et al, U.S. Patent No. 5,529,585 in view of Evani, U.S. Patent No. 4,242,408.

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Schrell discloses cellulosic fibers which are treated with a polyvinylamine. See col. 1, line 52-col. 2, line 50. This treatment enables the cellulosic fibers to be dyed with acid dyes such as those claimed. See col. 4, lines 54-61. The cellulosic fibers may be formed into yarns, woven, nonwoven and knitted fabrics. See col. 4, lines 13-15. Schrell et al differs from the claimed invention because Schrell does not teach employing the claimed complexing agent. Evani teaches treating cellulosic fibers with polymeric anionic reactive compounds such as maleic acid in order to enhance the strength and disposability of the fibers. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have applied the polymeric anionic reactive compounds of Evani to the cellulosic material of Schrell. One of ordinary skill in the art would have been motivated to apply the compounds of Evani to the cellulosic material of Schrell by the expectation that this would enhance the strength and disposability of the fibers.

5. Claims 24-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schrell in view of Evani as applied to claims 16-18, 20-23, 26-28 above, and further in view of JP 02-127,593. Neither Schrell nor Evani teach incorporating other fibers such as nitrogen containing fibers into the cellulosic fibrous material. JP '593 teaches incorporating polyamide fibers into cellulosic fibrous materials in order to enhance the strength of the cellulosic material. It would have been obvious to have incorporated polyamide fibers into the cellulosic fibrous materials of Schrell and Evani. One of ordinary skill in the art would have been motivated to incorporate the polyamide fibers by the expectation that these fibers would further enhance the strength of the cellulosic fibrous materials.

6. Claims 16-17, 19-20, 22-23, 26-28, 32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schrell in view of WO 00/11046 to Geer et al. Schrell teaches a cellulosic

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material as set forth above. Schrell does not teach employing the claimed complexing agent.

Geer teaches applying aldehyde functional polymers to cellulosic materials in order to enhance the strength of the material. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have applied the aldehyde functional polymers to the cellulosic material of Schrell. One of ordinary skill in the art would have been motivated to apply the aldehyde functional polymers to the cellulosic material of Schrell by the expectation that this would enhance the strength of the Schrell material.

7. Claims 24-25 rejected under 35 U.S.C. 103(a) as being unpatentable over Schrell in view of Geer et al as applied to claims 16-17, 19-20, 22-23, 26-28, 32 above, and further in view of JP 02-127,593. . Neither Schrell nor Geer teach incorporating other fibers such as nitrogen containing fibers into the cellulosic fibrous material. JP '593 teaches incorporating polyamide fibers into cellulosic fibrous materials in order to enhance the strength of the cellulosic material. It would have been obvious to have incorporated polyamide fibers into the cellulosic fibrous materials of Schrell and Geer. One of ordinary skill in the art would have been motivated to incorporate the polyamide fibers by the expectation that these fibers would further enhance the strength of the cellulosic fibrous materials.

8. Applicant's arguments filed 4/14/04 have been fully considered but they are not persuasive. Applicant argues that there is no motivation to combine Schrell and Evani because Schrell teaches away from the proposed combination because there is no motivation to use a complexing agent in order to bond the polyamine to the surface of the fiber since the polyamine is already present within the fiber of Schrell. However, the motivation set forth in the office action is to employ the complexing agent as taught by Evani in order to enhance the strength and

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disposability of the fibers. This motivation is clearly taught Evani and Schrell does not teach against it. Applicant argues that one wishing to improve acid dyeing of fabrics according to Schrell would not be motivated to look to the premoistened flushable tissue art. However, both Evani and Schrell are concerned with forming cellulosic fiber containing fabrics including nonwoven fabrics which have excellent wet strength, (see Evani abstract; col. 1, lines 23-26 and Schrell col. 1, lines 1-6, col. 4, lines 16-22.

Similarly, with regard to the rejection of the claims over Schrell in view of Geer, since both references are concerned with enhanced wet strength, it would have been obvious to have included the aldehyde function polymers to the cellulosic material of Schrell in order to enhance the strength of the material.

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Elizabeth M. Cole whose telephone number is (571)

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272-1475. The examiner may be reached between 6:30 AM and 6:00 PM Monday through Wednesday, and 6:30 AM and 2 PM on Thursday.

Mr. Terrel Morris, the examiner's supervisor, may be reached at (571) 272-1478.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

The fax number for all official faxes is (703) 872-9306.



Elizabeth M. Cole
Primary Examiner
Art Unit 1771

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